

CLAIMS

1. An interconnect for an electrical component comprising:  
a substrate;  
at least a pair of leads supported on said substrate leading to and from the  
electrical component; and  
a shunt extending between said pair of adjacent leads, said shunt being  
formed by a carbonized area of the surface of said substrate.
2. The interconnect of claim 1 wherein said leads include at least a pair of  
branched dead end leads and said shunt is formed between said dead end leads.
3. The interconnect of claim 1 and further including a cover layer.
4. The interconnect of claim 1 wherein said leads include at least a pair of leads  
extending adjacent to each other in a serpentine pattern on said substrate and said  
shunt is formed between said serpentine patterned leads.

5. The interconnect of claim 1 and further including a plurality of through holes extending through said substrate beneath said leads.
6. The interconnect of claim 5 and further including a cover layer.
7. The interconnect of claim 6 wherein said cover layer terminates at the edge of said through holes.
8. The interconnect of claim 1 and further including a shearable portion, said shunt being formed on said shearable portion.
9. The interconnect of claim 1 wherein said substrate is a polymer material.
10. The interconnect of claim 1 wherein said substrate is a polyimide material.
11. A dual layer interconnect including:  
a substrate having at least first and second surfaces;  
a first lead supported by said first substrate surface and a second lead supported by said second substrate surface, said second lead

including a dead end lead extending through said substrate to said first side and adjacent to said first lead; and  
a shunt extending between said first lead and said dead end lead of said second lead pair of adjacent leads, said shunt being formed by a carbonized area of the surface of said substrate.

12. The dual layer interconnect of claim 11 wherein said first lead includes at least a first lead pair of dead end leads branching therefrom and said second lead includes at least a pair of dead end leads branching therefrom and wherein said first lead pair and said second lead pair are interleaved with each other with said shunt extending between said pairs of dead end leads.
13. The interconnect of claim 12 and further including a cover layer.
14. The interconnect of claim 10 and further including a cover layer.
15. An interconnect for an electrical component comprising:

at least a pair of leads leading to and from the electrical component, said leads being at least partially supported by a carbonizable material engaging at least one surface of each of said leads; and a shunt extending between said pair of adjacent leads, said shunt being formed by a carbonized area of the surface of said carbonizable support material.

16. The interconnect of claim 15 wherein said leads include at least a pair of branched dead end leads and said shunt is formed between said dead end leads.

17. The interconnect of claim 15 and further including a substrate supporting and engaging at least one surface of said leads, wherein said carbonizable material is a cover layer.

18. The interconnect of claim 17 wherein said leads include at least a pair of leads extending adjacent to each other in a serpentine pattern on said substrate and said shunt is formed between said serpentine patterned leads.

19. The interconnect of claim 15 and further including a plurality of through holes extending through said substrate beneath said leads.
20. The interconnect of claim 15 wherein said carbonizable material encapsulates at least a portion of said leads.
21. The interconnect of claim 15 and further including:  
a plurality of through holes extending through said substrate beneath said leads; and  
a cover layer, wherein said cover layer terminates at the edge of said through holes.
22. The interconnect of claim 15 and further including a shearable portion, said shunt being formed on said shearable portion.
23. The interconnect of claim 15 wherein said carbonizable material is a polymer material.
24. The interconnect of claim 15 wherein said substrate is a polyimide material.

25. The interconnect of claim 15 wherein said interconnect is a dual layer interconnect including:

- a substrate having at least first and second surfaces;
- a first lead of said at least one pair of leads supported by said first substrate surface and a second lead supported by said second substrate surface, said second lead including a dead end lead extending through said substrate to said first side and adjacent to said first lead; and
- a shunt extending between said first lead and said dead end lead of said second lead pair of adjacent leads, said shunt being formed by a carbonized area of the surface of said carbonizable material.

26. The dual layer interconnect of claim 25 wherein said first lead includes at least a first lead pair of dead end leads branching therefrom and said second lead includes at least a pair of dead end leads branching therefrom and wherein said first lead pair and said second lead pair are interleaved with each other with said shunt extending between said pairs of dead end leads.

27. The interconnect of claim 26 and further including a cover layer, wherein said cover layer is said carbonizable material and said shunt is formed thereon.

28. The interconnect of claim 25 and wherein said substrate is said carbonizable material and said shunt is formed thereon.

29. The interconnect of claim 25 and further including a cover layer, wherein said cover layer is said carbonizable material and said shunt is formed thereon.